

REMARKS/ARGUMENTS

Favorable reconsideration of this application, as presently amended, is respectfully requested.

Claims 18-30 are pending. Claims 1-17 were previously canceled without prejudice or disclaimer.

The outstanding Action presents a rejection of Claims 20-25, 27, and 28 under 35 U.S.C. §102(b) as being anticipated by Giannopoulos et al. (U.S. Patent No. 6,359,387, Giannopoulos), a rejection of Claims 18 and 19 under 35 U.S.C. §103(a) as being unpatentable over Giannopoulos in view of Sun et al. (U.S. Patent No. 6,020,691, Sun), and a rejection of Claims 26 and 29-30 under 35 U.S.C. §103(a) as being unpatentable over Giannopoulos in view of Yoshida et al. (U.S. Published Patent Application No. 2002/0027412, Yoshida).

WITHDRAWAL OF IMPROPER ACTION

It is again noted that it was the indication of allowable subject matter as to Claims 21-24 that led to Claim 21 being rewritten in independent form. The outstanding Action again fails to follow PTO established requirements as to rejecting Claim 21 and Claims 22-24 that were previously noted to contain allowable subject matter. In this respect, MPEP § 706.04 states that:

Because it is unusual to reject a previously allowed claim, the examiner should point out in his or her office action that the claim now being rejected was previously allowed by using Form Paragraph 7.50.

¶ 7.50 Claims Previously Allowed, Now Rejected, New Art

The indicated allowability of claim [1] is withdrawn in view of the newly discovered reference(s) to [2]. Rejection(s) based on the newly cited reference(s) follow.

Accordingly, withdrawal of this improper Action that fails to properly withdraw the previously indicated allowability of Claims 21-24 is again respectfully requested.

In addition, it is noted that the amendment filed December 20, 2007, included arguments against the rejection of base independent Claim 21 under 35 U.S.C. §102(b) as being anticipated by Giannopoulos, a rejection repeated by the outstanding Action. MPEP §707.07(f) indicates that a proper Action is to take note of the points raised in traversing such a repeated rejection and answer the substance thereof. The outstanding Action not only does not answer the substance of any of the points raised in traversing this repeated rejection of independent Claim 21 under 35 U.S.C. §102(b) as being anticipated by Giannopoulos, it also does not answer the substance of any of the points raised at page 8 of this Amendment in traverse of the rejection of dependent Claims 22-24 under 35 U.S.C. §102(b) as being anticipated by Giannopoulos. These repeated rejections lacking any actual treatment of these points raised as to traversing these rejections is further not consistent with the statement under the heading “Response to Arguments” (item 6) noting that “Applicant’s arguments, see remark/arguments, filed 12/20/07, with respect to claims 18-30 have been fully considered and are persuasive.” If these arguments as to the rejection of Claims 21-24 under 35 U.S.C. §102(b) as being anticipated by Giannopoulos had been actually “fully considered” and actually found “persuasive” the rejection of at least Claims 21-24 under 35 U.S.C. §102(b) as being anticipated by Giannopoulos would have been withdrawn, not repeated which is the actual treatment in the outstanding Action.

In any event, as the outstanding Action clearly violates the requirements of MPEP §707.07(f) in terms of not taking note of the points raised in traversing such repeated rejections and answer the substance thereof, withdrawal of the outstanding action with the repeated rejections of Claims 20-24, and 27-28 under 35 U.S.C. §102(b) as being anticipated by Giannopoulos, the repeated rejection of Claims 18 and 19 under 35 U.S.C. §103(a) as

being unpatentable over Giannopoulos in view of Sun, and the repeated rejection of Claims 29-30 under 35 U.S.C. §103(a) as being unpatentable over Giannopoulos in view of Yoshida is respectfully submitted that the outstanding Action must be withdrawn for this reason as well as for violating the above-noted procedure set forth by MPEP § 706.04.

RESPONSE TO OUTSTANDING ACTION

The rejection of independent Claims 21 as being anticipated by Giannopoulos is based on FIGS 1-5 that are again improperly treated as relating to one arrangement. However, as noted in the last response, there is no suggestion in Giannopoulos that FIGS. 1-5 can be lumped together. Instead, FIGS. 1, 2, 4, and 5 are clearly noted to be drawn to different ballast and fluorescent lamp arrangements with FIG. 3 being clearly noted to be drawn to a control circuit for the FIG. 1 arrangement at col. 3, lines 35-52, for example.

In this last regard, anticipation requires the citation of a single prior art reference that discloses each and every element arranged together exactly as in the claimed arrangement.

See In re Bond, 15 USPQ2d 1566 (Fed. Cir. 1990); Lindemann Maschinen Fabrik GMBH v. American Hoist & Derrick Co., 221 USPQ 481 (Fed. Cir. 1984); Ex parte Gould, 6 USPQ2d 1680 (Bd. Pat. App. & Int. 1987); and Ex parte Osmond, 191 USPQ 334 (Bd. Pat. App. & Int. 1973).

Thus, there must be something that the PTO can point to in Giannopoulos directing the person skilled in the pertinent art to rearrange the expressly noted different embodiments of FIGS. 1, 2, 4, and 5 into a further conglomerated arrangement as relied on in the outstanding Action. See In re Rijckaert, 9 F.3d 1531, 1533, 28 USPQ2d 1955, 1957 (Fed. Cir. 1993) (“When the PTO asserts that there is an explicit or implicit teaching or suggestion in the prior art, it must indicate where such a teaching or suggestion appears in the reference.”).

Instead of pointing to any such teaching of conglomerating the different embodiments of ballast and fluorescent lamp arrangements of FIGS. 1, 2, 4, and 5 of Giannopoulos, the paragraph bridging pages 2 and 3 of the outstanding Action arbitrarily selects isolated elements from the different embodiments of Giannopoulos and erroneously suggests that because these isolated elements all appear in one reference, anticipation is established in violation of the above noted controlling decisions and *In re Kotzab*, 217 F.3d 1365, 1371, 55 USPQ2d 1313, 1317 (Fed. Cir. 2000) as follows:

Further, a rejection cannot be predicated on the mere identification in [one reference] of individual components of claimed limitations. Rather, particular findings must be made as to the reason the skilled artisan, with no knowledge of the claimed invention, would have selected these components for combination in the manner claimed.

Moreover, the analysis of this paragraph of the outstanding Action not only improperly picks and chooses elements disclosed by Giannopoulos to be in different embodiments without any presentation of any reasons for such selections, it improperly interprets these elements relative to the claimed subject matter. In this regard EL1 of Giannopoulos only appears in FIG. 1 and is disclosed (at col. 4, lines 1-2) to be a “filamentary electrode heater at each end of the lamp.” There is no element “EL2” disclosed by Giannopoulos so that reliance on “EL2” of Giannopoulos as corresponding to either the first or second electrode required by base independent Claim 21 is clearly improper.

Also, while FIG. 5 shows a “common single isolating transformer T5” (col. 6, lines 19-22), there is no teaching in the discussion of FIG. 5 that this transformer is “a resonant transformer, or that T5 “uses the inductance of its winding in combination with capacitance (C_r5) in series” as urged in this paragraph of the outstanding Action. While the discussion of FIG. 1 treats a “resonance capacitance C_r,” (at col. 4, line 7), this “resonance capacitance C_r” is clearly coupled in series with resonance inductor L_r to form the “resonant load circuit”

discussed at col. 3, lines 65-66 which appears to be suggested by series connected components L_r5 and C_r5 of FIG. 5, not the winding W_p5 of the isolation transformer that is in a parallel branch with resistor R_s5 as illustrated in FIG. 5.

Further, Giannopoulos does not teach or suggest that control circuit 11 of FIG. 1 is used with FIG. 5, that control circuit 11 is “for fixing the frequency at substantially the resonant frequency of the system of the structure (defined by Claim 21 to be “at least first and second electrodes and a space containing a gas to be excited”) and the inductor (defined by Claim 21 to be “in the form of a transformer provided with a primary winding and with a secondary winding, the primary winding connected to the voltage generator and the secondary winding connected to the first and second electrodes to supply the first and second electrodes with a periodic voltage of a frequency”). Instead, col. 4, lines 28-41, of Giannopoulos teach that:

When the ballast is first energized, the control 11 causes the heater inverter to operate at a predetermined frequency, typically between 20 kHz and 60 kHz. The voltage across the resistor R_s is sampled to determine the cold impedance presented by the two heater circuits of the lamp FL1 and, preferably, also the cold resistance. A microprocessor control unit in the control circuit determines the lamp type corresponding to the cold impedance. When the electrodes have reached the correct temperature, determined for example as a resistance 4 times the cold resistance, the arc current inverter formed by switches G1 and G2 is enabled, and its frequency and/or conduction angle are controlled to produce the predetermined operating values for that lamp type.

Furthermore, none of FIGS. 1-5 teach or suggest all of the Claim 21 limitations including the requirement that:

... the resonance means comprises a switch placed in a path from the voltage generator to the primary winding of the transformer, and a control system connected to the switch to open and close the switch over a period, wherein closing of the switch, which is closed for a duration, is triggered by choice at one of the following instants:

- at a zero crossing of the current flowing through the structure;
- when the voltage crosses a threshold voltage;
- at a threshold light level; or

when the current flowing through the structure crosses a threshold current.

Apparently realizing that there are no teachings or suggestions in FIG. 1 and control circuit 11 of Giannopoulos of this required triggering of the recited switch at one of the listed instants, the outstanding Action turns to FIG. 5 and switch G1 of that Figure shown connected to the primary winding of isolation T5 via the isolation capacitor C_i and the resonance inductor L_r that is completely separate from the isolation transformer T5.

Although the required switch is first identified as G1, the outstanding Action quickly changes this to G1-G2 and makes inappropriate reference to col. 5, lines 55-65 that relate to control circuit 11 that feeds two inverters G1-G2 and G3-G4 and not the single inverter G1-G2 of FIG. 5. the frequency of the heater inverter G1-G2 associated with FIG. 3 and control circuit 1 has nothing to do with the two inverter embodiment of FIG. 1 and like the single inverter embodiment of FIG. 4 must first (before lamp ignition) operate at a fixed frequency with the frequency causing the opening and closing of switches G1 and G2 at fixed times and not based upon the Claim 21 criteria set forth above. Note col. 6, lines 22-23, that state that “[o]peration of this arrangement is like that of the embodiment of FIG. 4” and col. 6, lines 10- 18, stating that:

The control circuit 41 will be structurally like that of FIG. 3, except that only a single clock generator is required, and the pulse width modulator drives only one inverter. The ballast may initially be operated at a predetermined frequency and/or pulse width at which the voltage across C_r 4 is less than what will cause any lamp type to ignite. After the cold impedance has been measured, the installed lamp type is determined. The inverter is then operated normally for that lamp type.

Accordingly, withdrawal of the anticipation rejection of independent Claim 21 by Giannopoulos is again respectfully requested as this reference cannot be reasonably said to teach, or even suggest, all of the limitations of this independent claim.

The rejection of dependent Claims 22-25, 27, and 28 under 35 U.S.C. §102(b) as being anticipated by Giannopoulos is traversed at least because each of these claims directly

depends on independent Claim 21 and patentably defines over Giannopoulos for the reasons noted above as to parent Claim 21.

In addition, the outstanding Action has improperly equated a concept of zero current to the entirely different recitation of dependent Claim 22 requiring triggering “at the current zero crossing” as being when no current is output by the inverter. However, a zero crossing by an alternating type current is not the same thing as zero current.

Also, the outstanding Action has improperly interpreted the recitation of Claim 23 requiring triggering “when the voltage crosses the threshold voltage” to be taught at col. 6, lines 25-31. However, this portion of Giannopoulos only mentions voltage in terms of “[a]fter ignition, the voltage across the measuring resistor R_{s5} will be much greater than in the other embodiments, but it may be used to detect the lamp operating parameters to achieve desired control” that has nothing to do with any voltage crossing any threshold.

In addition, the outstanding Action has improperly interpreted the recitation of Claim 24 requiring “the duration of the time during which the switch is closed is adjusted according to energy to be delivered to the structure” as somehow taught as to “control 51 and the sensor (R_s)” at the top of page 4 of the outstanding Action. Applicant can find no hint in Giannopoulos that “control 51 and the sensor (R_s)” somehow are to cooperate to achieve the Claim 24 requirement that “the duration of the time during which the switch is closed is adjusted according to energy to be delivered to the structure.”

The outstanding Action has also improperly interpreted the recitation of Claim 25 for “the frequency” (that must be fixed by the Claim 21 resonance means “at substantially the resonant frequency of the system of the structure and the inductor”) to be between 10 and 300kHz as there is no teaching at col. 2, lines 20-21 that the control 11 operation of just the heater inverter at a predetermined frequency, typically between 20 kHz and 60 kHz, has

anything to do with a frequency that is “at substantially the resonant frequency of the system of the structure and the inductor.”

Therefore, Claims 22-25 are respectfully submitted to patentably define over Giannopoulos for the further features added by these claims that are also not taught or suggested by Giannopoulos. Accordingly, withdrawal of the anticipation rejection of Claims 22-25 by Giannopoulos is also respectfully requested for this reason as well.

The rejection of Claims 18 and 19 under 35 U.S.C. §103(a) as being unpatentable over Giannopoulos in view of Sun and the rejection of Claims 26, 29, and 30 under 35 U.S.C. §103(a) as being unpatentable over Giannopoulos in view of Yoshida are traversed because Claims 18, 19, 26, 29, and 30 now all depend directly or indirectly on independent parent Claim 21 and neither Sun nor Yoshida cure the deficiencies of Giannopoulos as noted above.

Claims 20, 26, and 27 now directly depend from Claim 21 and Claim 28 now indirectly depend from Claim 21. Accordingly these claims should be considered to be allowable for the same reasons set forth above as to parent Claim 21.

Further, Claims 18, 19, 26, 29, and 30 add further features not taught or suggested by any of Giannopoulos, Sun, or Yoshida and patentably define over these references taken alone or in any proper combination for this reason as well. Accordingly, withdrawal of these 35 U.S.C. §103(a) rejections is respectfully requested for this reason as well.

In view of the foregoing amendments and remarks, it is respectfully submitted that no further issues remain outstanding in the present application, and that this application is clearly in condition for formal allowance and an early and favorable action to that effect is, therefore, respectfully requested.

Respectfully submitted,

OBLON, SPIVAK, McCLELLAND,
MAIER & NEUSTADT, P.C.



Gregory J. Maier
Attorney of Record
Registration No. 25,599

Surinder Sachar
Registration No. 34,423

Customer Number
22850

Tel: (703) 413-3000
Fax: (703) 413 -2220
(OSMMN 06/04)

I:\ATTY\RFC\28\284467-AM3.DOC